Claims 1, 3 and 5 to 15 were rejected under 35 U.S.C. § 103(a) over U.S. Patent No. 6,336,045 (Brooks) in view of "*Biomedical Applications of Micro-and Nanoengineering*", Proceedings of SPIE Vol. 4937, 2002 (Nicolau). The rejections are respectfully traversed.

The claims are directed to a method and apparatus for identifying a living body by deriving a time waveform of an electromagnetic wave, in which a delay time of the electromagnetic wave is caused by a change of position of the living body.

By way of background, a time waveform is conventionally obtained using a Terahertz Time Domain Spectroscopy system incorporating a delay stage. The delay stage is ordinarily moved to generate a delay.

On the other hand, the present claims derive the time waveform according to a delay time of the electromagnetic wave, wherein the delay time is caused by a change of position of a living body. By virtue of the foregoing, it is possible to generate a delay using a change of position of a living body, rather than a delay stage.

Turning to specific claim language, independent Claim 1 is directed to a method of identification of a living body. The method comprises the steps of detecting an electromagnetic wave in a frequency band ranging from 300 GHz to 30 THz generated from the living body, deriving a time waveform of the electromagnetic wave by sampling the electromagnetic wave detected in the detecting step, extracting biological information by filtering the time waveform through a frequency property, and comparing the biological information with preliminarily memorized biological information. The time waveform is derived according to the delay time of the electromagnetic wave caused by the change of position of the living body.

The applied references, even if properly combined, are not seen to disclose

or suggest the subject matter of Claim 1.

In particular, none of Brooks and Nicolau disclose or suggest at least the claimed feature that the delay time of the electromagnetic wave is caused by a change of position of the living body.

For its part, Brooks discloses a system for measuring electric and magnetic properties of an organism in order to determine the organism's identity. The system induces and detects current flow through the organism, analyzes the detected current flow, and compares the detected property with a previously stored property. Brooks, column 24, lines 21 to 34. Brooks provides that when a portion of an organism interrupts an electric or magnetic field, a detector measures the amount of interruption and compares it to previously identified information to identify the organism. Brooks, column 14, line 35, to column 15, line 5. Nowhere is Brooks understood to disclose or suggest delaying an electromagnetic wave by a delay time.

Page 3 of the Office Action states that a time waveform in Brooks is derived according to a delay time of an electromagnetic wave. Applicants respectfully disagree with this assessment of Brooks. In Applicants' view, Brooks does not derive a time waveform according to a delay time of an electromagnetic wave. Indeed, the word "delay" does not appear anywhere in Brooks. As a consequence, it remains Applicant's opinion that Brooks does not disclose at least the claimed feature that the time waveform of an electromagnetic wave is derived according to a delay time of the electromagnetic wave, wherein the delay time is caused by the change of position of a living body being identified.

Nicolau has been studied, but is not seen to overcome the deficiencies of

Brooks. In particular, while Nicolau discusses using a terahertz pulse to statistically classify biomaterials, it does not disclose implementation details for the system used. Specifically, Nicolau fails to disclose or suggest derivation of a time waveform of an electromagnetic wave according to a delay time of the electromagnetic wave, wherein the delay time is caused by the change of position of a living body being identified.

Therefore, Brooks and Nicolau, even if combined, cannot provide an effect of the Claim 1 arrangement, in that the electromagnetic wave is delayed by a delay time caused by a change of position of a living body, rather than a delay stage.

For the above reasons, the applied references are not seen to disclose or suggest the features of Claim 1. It is therefore believed that Claim 1 recites subject matter that would not have been obvious. Withdrawal of the rejection of Claim 1 is therefore respectfully requested.

Independent Claims 6 to 8, 10 and 12 are likewise seen as allowable over the applied combination of Brooks and Nicolau. Allowance of these claims is therefore respectfully requested.

The other claims in the application are each dependent from the independent claims and are believed to be allowable over the applied references for at least the same reasons. Because each dependent claim is deemed to define an additional aspect of the invention, however, the individual consideration of each on its own merits is respectfully requested.

No other matters having been raised, the entire application is believed to be in condition for allowance and such action is respectfully requested at the Examiner's earliest convenience.

REQUEST FOR INTERVIEW

If upon consideration of this response, the Examiner still has concerns as to the patentability of the claims, Applicants respectfully request that the Examiner contact Applicants' undersigned representative to arrange an interview.

Applicants' undersigned attorney may be reached in our Costa Mesa, California office by telephone at (714) 540-8700. All correspondence should be directed to our address given below.

Respectfully submitted,

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